AMENDED LISTING OF CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in this application:

1. (Currently amended) A method for determining therapeutic resonant frequencies of electromagnetic radiation ~~emission~~ for influencing ~~a medium surrounding~~ a ~~target~~ genomic material, ~~nucleic acid chain, said nucleic acid chain being sensitive to the electromagnetic response characteristics of the surrounding medium,~~ wherein the genomic material causes disease, or is associated with a disease-causing pathogen, or is implicated in causation of disease, the genomic material being surrounded by a medium, comprising:

providing a frequency-emitting device; ~~capable of producing a frequency-influenced electric field, or magnetic field, or electromagnetic field, or electrical current emission;~~

determining a velocity ~~for the propagation~~ of the electromagnetic radiation ~~emission~~ through the medium surrounding the genomic material; ~~target nucleic acid chain;~~

determining a length ~~parameter~~ of the genomic material; ~~target nucleic acid chain when said target nucleic acid chain material consists of double-stranded or single-stranded molecules consisting of deoxyribonucleic acid or ribonucleic acid; said target nucleic acid chain comprising a plurality of nucleotide bases spaced apart by an average spacing, the average spacing comprising a known value, by obtaining the number of nucleotide bases in a single strand of the target nucleic acid chain, in the case of double-stranded molecules not including the number of nucleotide bases in the complementary strand; and multiplying said number of nucleotide bases by the known value for the average spacing between the nucleotide bases;~~

determining a first therapeutic resonant frequency to influence the genomic material ~~to influence the medium-sensitive target nucleic acid chain~~ in a first electromagnetic frequency range, by dividing the velocity of the electromagnetic radiation through ~~emission in~~ the ~~surrounding~~ medium surrounding the genomic material by the length ~~parameter~~ of the genomic material; ~~target nucleic acid chain;~~

~~multiplying or dividing~~ dividing or multiplying the first therapeutic resonant frequency by a factor of a power of two, to ~~provide a second~~ obtain at least one other therapeutic resonant frequency in ~~another~~ at least one other electromagnetic frequency range capable of being emitted by the frequency-emitting device;

programming the frequency-emitting ~~frequency-capable emission~~ device to emit at least one resonant frequency in its range of capability; ~~the either first or second resonant frequency;~~ and

~~selectively influencing the target nucleic acid chain with the first or second resonant frequency when the frequency-capable emission device emits said first or second resonant frequency into the medium surrounding the target nucleic acid chain.~~

influencing the disease-causing or disease-associated genomic material with at least one resonant frequency emitted from the frequency-emitting device, thereby debilitating or stimulating the genomic material or the pathogen associated with the genomic material, and rendering a therapeutic or desirable effect to the host or system.

2. (Currently Amended) The method of claim 1, wherein determining the length ~~parameter~~ of the genomic material ~~target nucleic acid chain~~ comprises using the known spacing value between adjacent base pairs or bases, ~~nucleotide bases~~ determining the number of base pairs or bases in the genomic material, and multiplying the number of base pairs or bases ~~nucleotide bases~~ in the genomic material ~~target nucleic acid chain~~ by the known spacing value between adjacent base pairs or bases, ~~nucleotide bases,~~ and using the resulting value as a wavelength. ~~parameter.~~

3. (Canceled)

4. (Currently Amended) The method of claim 1, wherein the medium surrounding the genomic material is in-vivo tissue having ~~target nucleic acid chain has~~ a unique electrical permittivity, wherein determining the velocity ~~for the propagation~~ of electromagnetic radiation through ~~emission in~~ the medium surrounding the genomic material ~~target nucleic acid chain~~ .

comprises relating the unique electrical permittivity of in-vivo tissue to the velocity, ~~obtaining the unique electrical permittivity value for the medium under consideration, and then determining said medium-associated velocity,~~ wherein velocity = $1 / \sqrt{(\varepsilon \mu)}$, where ε is the electrical permittivity of the medium, and μ is the magnetic permeability of the medium.

5. (Currently amended) The method of claim 4, further comprising the step of determining a refractive index of the electromagnetic radiation through ~~emission in~~ the in-vivo tissue by dividing the speed of light in a vacuum by the speed of light in the in-vivo tissue, wherein dividing one resonant frequency determined for the genomic material ~~target nucleic acid chain~~ surrounded by air by the refractive index for in-vivo tissue yields ~~one of the~~ a resonant ~~frequencies~~ frequency for the genomic material ~~target nucleic acid chain~~ surrounded by in-vivo tissue.

6. (Currently amended) The method of claim 1, further comprising the steps of:

dividing ~~the first or second~~ at least one previously calculated resonant frequency by a positive integer to determine subharmonic frequencies,

multiplying ~~the first or second~~ at least one previously calculated resonant frequency by a positive integer to determine harmonic frequencies,

programming the frequency-emitting ~~frequency-capable emission~~ device to emit the harmonic and/or subharmonic frequencies, and

~~selectively~~ influencing the ~~target~~ genomic material ~~nucleic acid chain~~ with ~~the first or second~~ at least one resonant frequency and/or ~~the~~ at least one harmonic and/or subharmonic frequencies, when the frequency-emitting ~~frequency-capable emitting~~ device emits ~~the first or second~~ at least one resonant frequency and/or the harmonic and/or subharmonic frequencies into the medium surrounding the target genomic material. ~~nucleic acid chain.~~

7. (Cancelled)

8. (Currently amended) The method of claim 1, wherein ~~selectively~~ influencing the ~~target~~ genomic material ~~nucleic acid chain~~ comprises debilitating or stimulating the ~~target~~ genomic material. ~~nucleic acid chain~~.

9. (Currently Amended) The method of claim 1, wherein ~~selectively~~ influencing the ~~target~~ genomic material ~~nucleic acid chain~~ with ~~the first or second~~ at least one resonant frequency comprises ~~selectively~~ influencing genomic material ~~nucleic acid chains present~~ in humans.

10. (Currently Amended) The method of claim 1, wherein ~~selectively~~ influencing the ~~target~~ genomic material ~~nucleic acid chain~~ with ~~the first or second~~ at least one resonant frequency comprises ~~selectively~~ influencing genomic material ~~nucleic acid chains present~~ in animals.

11. (Currently Amended) The method of claim 1, wherein ~~selectively~~ influencing the ~~target~~ genomic material ~~nucleic acid chain~~ with ~~the first or second~~ at least one resonant frequency comprises ~~selectively~~ influencing genomic material ~~nucleic acid chains present~~ in agricultural settings.

12. (Currently Amended) The method of claim 1, wherein ~~selectively~~ influencing the ~~target~~ genomic material ~~nucleic acid chain~~ with ~~the first or second~~ at least one resonant frequency comprises ~~selectively~~ influencing genomic material ~~nucleic acid chains present~~ in water systems.

13. (Currently Amended) The method of claim 1, wherein ~~selectively~~ influencing the ~~target~~ genomic material ~~nucleic acid chain~~ with ~~the first or second~~ at least one resonant frequency comprises ~~selectively~~ influencing genomic material ~~nucleic acid chains present~~ in food processing systems.

14. (Cancelled)

15. (Cancelled)

16. (Cancelled)
17. (Cancelled)
18. (Cancelled)
19. (Cancelled)
20. (Cancelled)
21. (Cancelled)
22. (Cancelled)
23. (Cancelled)
24. (Cancelled)
25. (Cancelled)
26. (Cancelled)
27. (Cancelled)
28. (Cancelled)
29. (Cancelled)